

NATIONAL PARK SERVICE
VALLEY FORGE NATIONAL HISTORICAL PARK
ENVIRONMENTAL MANAGEMENT PLAN



Date of Plan: December 2005

Environmental Management Plan (EMP)

December 2005

This Environmental Management Plan for Valley Forge National Historical Park (VAFO) and documents the Environmental Management System for the Park. The development and revision history and distribution list of the Plan are as follows:

1. The current version was prepared in December 2005 and represents the second and final draft of the EMP.
2. The Plan will be reviewed annually by the Environmental Management Team (EMT).
3. The Plan is distributed to the members of the EMT (see appendix, Section 4.0) and to the Superintendent.
4. Previous hard copy versions of the Plan are returned to the EMT and recycled.
5. Previous electronic copies of the EMP are deleted.

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INTRODUCTION TO THE VAFO ENVIRONMENTAL MANAGEMENT PLAN

- 1) This Plan describes the Environmental Management System (EMS) in place at VAFO.
- 2) The VAFO EMS includes all eight Elements of the Model National Park Service EMS and conforms to the minimum requirements contained therein.
- 3) The Plan documents the overall EMS activities and the current EMS targets. Sections 2 and 3 describe the process followed to choose the targets of the current year.
- 4) Each section contains the following sections:
 1. Purpose
 2. Scope
 3. Procedure
 4. Responsibilities
 5. Appendix
 6. Related Documentation
 7. Records

1.0 ENVIRONMENTAL COMMITMENT STATEMENT (ECS)

1.1 Purpose

The purpose of this section is to describe the scope of the Environmental Commitment Statement (ECS), the procedure used to develop and distribute it, and the responsible parties. Included is the latest edition of our ECS.

1.2 Scope

The ECS governs the EMS activities at VAFO.

1.3 Procedure

1.3.1 The ECS is prepared by the VAFO Environmental Management Team (EMT). The ECS is signed by the Superintendent and has the full commitment of VAFO management. (Section 4 of this EMS Manual contains a list of EMT members and their contact information).

1.3.2 The ECS is communicated to all personnel at VAFO. The communication process is described in Section 5 of this Manual.

1.3.3 The guidelines of Element A of the Model NPS EMS have been followed in preparing the ECS. Those guidelines are considered in determining how the EMS can enhance environmental management activities at the parks.

- 1.3.4 In addition to the procedures described in Section 5, a copy of the ECS is posted at key locations throughout the parks (including all visitor centers and the park headquarters buildings). A copy of the ECS is provided in the appendix to this section.

1.4 Responsibilities

- 1.4.1 The EMT reviews the ECS annually to ensure that it is current and fully expresses the environmental management priorities of the parks.
- 1.4.2 The Superintendent reviews any new version of the ECS.
- 1.4.3 The Superintendent signs the current final version of the ECS to demonstrate his or her management commitment and provides a signed copy to the EMT.
- 1.4.4 The EMT posts the ECS on the park websites and on employee bulletin boards.

1.5 Appendix

1.5.1 This appendix contains the current version of the VAFO ECS.

<i>VAFO EMS</i> <i>Document Control System</i>	Date of Original Doc: 11-16-05	Revision Date: n/a	Revision No. n/a
Doc Name: Environmental Commitment Statement	Document Number: VAFO-EMP-1	Prepared By: EMT	Approved By: Superintendent

ENVIRONMENTAL COMMITMENT STATEMENT

The purpose of Valley Forge National Historical Park is to educate the American people about one of the most defining events in our nation's history by preserving the natural and cultural resources that commemorate the encampment of the Continental Army at Valley Forge in 1777-78. Valley Forge NHP, while preserving these significant cultural and natural resources, will also provide environmental leadership by meeting the highest possible standards for protecting environmental quality, maximizing resource protection and minimizing waste generation. A key to success is the education of staff, park partners, and the visiting public about the benefits of environmentally preferable practices, programs, products, and behaviors. Our goal is to become a leader in environmental stewardship of our cultural and natural resources in an urban setting. Therefore, Valley Forge NHP will:

- Comply with all applicable Federal, State, and local environmental laws, regulations, Executive Orders, and Department of the Interior environmental policies.
- Work toward integrating and implementing environmentally sensitive best management practices including pollution prevention and waste reduction into all park operations.
- Prioritize the purchase of products that are non-toxic, biodegradable, and made of recycled and recyclable materials.
- Assign clear responsibility to park Division Chiefs for environmental activities and hold them accountable for their environmental performance, recognizing superior effort when demonstrated.
- Plan, design, construct and operate facilities in a manner that conserves energy and water, minimizes materials use and waste, and otherwise minimizes adverse environmental impacts.
- Use clean and renewable energy sources wherever feasible in our park operations.



Mike Caldwell, Superintendent
Valley Forge National Historical Park

2.0 FACILITY ACTIVITIES AND ENVIRONMENTAL IMPACTS

2.1 Purpose

This section contains the procedures followed to assess the facility activities and environmental impacts. Additional procedures included in this section describe how those activities and impacts are ranked to determine which are significant to the environment at VAFO. An understanding of these facility activities and environmental impacts is important to determine the focus of the EMS, and the areas where positive change in environmental management can be expected.

2.2 Scope

All activities that occur at VAFO (including those of third parties, contractors, and associations) are subject to assessment.

2.3 Procedure

2.3.1 The EMT annually reviews VAFO facilities and operations including, but not limited to, current activities and impacts; environmental compliance requirements stemming from all applicable laws, regulations, and policies including open audit findings; NPS, WASO and regional goals; and other objectives and direction, including those established by DOI or OFEE. Activities are also reviewed with respect to the mission of the parks, the ECS, recent performance results, and input from park partners.

2.3.2 The park EMT completes an interactions and impacts analysis. In assessing these interactions, a scoring system is used to determine the most significant impacts to the park and therefore potential areas of focus in the EMS. The latest version of the scoring system is included in Section 2.5 of Appendix.

2.3.3 Interactions, impacts, and legal and other requirements are reviewed on an annual basis, in conjunction with the senior management review, to determine if there are any changes that should be reflected in the EMS.

2.4 Responsibilities

It is the responsibility of the EMT to conduct the facility activities and the environmental impact assessment.

2.4.2 The EMT summarizes the assessment and briefs park management on its content and proposed goals, objectives, and targets.

2.4.3 The results of the assessment are included in the appendix to this section of the Manual.

2.4.4 The EMT briefs park management upon achievement of specific EMS targets (see Section 7).

2.5 Appendix

This appendix contains two documents.

2.5.1 Facility Interaction Assessment.

<i>VAFO_ EMS</i> <i>Document Control System</i>	Date of Original Doc: 11-16-05	Revision Date: n/a	Revision No. n/a
Doc Name: Facility Interaction Assessment	Document Number: VAF0-EMP-2	Prepared By: EMT	Approved By: EMT

Facility Interactions and Impacts Analysis

Facility Activity	Interaction	Impact
1. Hazardous Materials Storage and Handling AF, EO, R, HS, E,	Staff store, handle, and use hazardous materials in a variety of tasks (i.e., activities such as cleaning, degreasing, painting, and corrosion prevention).	Potential impact upon staff health through absorption, ingestion, inhalation, or injection of hazardous materials if improperly stored, handled, or used; possible fire hazards from incorrect storage of corrosives with flammable substances; possible environmental releases (liquid spills, vapors) from products not stored or handled properly; costly and time-consuming disposal of spent/used materials contaminated through incorrect eparation; potential for disposal of waste products and in landfills.
2. Green Parks (Conservation, Recycling and Purchasing) AF, EO,	Staff, contractors, and visitors use energy for lighting, heating, air conditioning, pumping water, transport, and maintenance activities. They also generate recyclable waste such as paper, aluminum, steel, tires, batteries and plastic. Staff purchase and use a wide variety of products and equipment.	Use of fossil fuels to generate power is a one-time consumptive use; generation of emissions at power stations has a local, regional, and global impact upon the air, land, and water. Wastes generated create disposal costs and environmental risks (water or air pollution) if not handled and disposed of properly.
AF=Audit Finding EO=Required by Executive Order R=Required by Regulation HS=Health and Safety Issue E=Environmental Issue		

3. Vehicle & Equipment Use & Maintenance AF, EO, R, HS, E	Operation and maintenance of vehicles & equipment uses fuel, electricity, and raw materials. These activities generate air emissions, wastewater, solid wastes, and hazardous wastes.	Consumptive use of fuel, electricity, water and raw materials. Wastes generated create disposal costs / environmental risks (water or air pollution) if not handled and disposed of properly. Spills & leaks can cause water, soil, and air pollution concerns.
4. Emergency Planning and Operations AF, R, HS, E	Natural and man-made incidents are a constant threat to park resources and to visitor and employee safety.	Potential impact to any or all park resources either directly or indirectly. Visitor and employee safety can be compromised due to inadequate or improper emergency procedures. Emergency Medical activities generate medical waste and potential employee exposure to bloodborne pathogens.
5. Property Management and Disposal EO	Park staff store excess, obsolete, or unserviceable property and equipment, often outdoors, pending disposal.	Storage of old property/equipment creates opportunities for spills and leaks. Disposal costs the park operating dollars and generates solid and hazardous wastes.
6. Building Maintenance (Renovation, demolition, major construction/ rehab projects, HVAC, plumbing, general cleaning, carpentry, etc.) AF, EO, R, HS, E,	Building maintenance activities use electricity, water, fuel, raw materials and chemical products. This generates solid, universal, and hazardous wastes.	Consumptive use of raw materials, power, fuel, and water. Lead paint, asbestos, dusts, and the use of chemical products and generation of wastes contribute to employee health and safety risks. Wastes generated create disposal costs and environmental risks (water or air pollution) if not handled and disposed of properly.
7. Custodial AF, EO, R, HS, E,	Cleaning of park facilities uses electricity, fuel, water and a variety of chemical products; and generates wastewater, solid wastes and hazardous wastes.	Consumptive use of power, fuel, water and raw materials. Employee health and safety risks from potential exposure to diseases and chemicals. Wastes generated create disposal costs and environmental risks (water, soil or air pollution) if not handled and disposed of properly.
AF=Audit Finding EO=Required by Executive Order R=Required by Regulation HS=Health and Safety Issue E=Environmental Issue		

8. Black Powder Operations HS, E,	Staff and volunteers operate and maintain black powder and weapons.	Potential impact upon staff and volunteer health through improper use. Possible fire hazard if improperly stored, handled, or used.
9. Environmental Training and Education AF, EO, R, HS, E,	Employees are involved in a variety of activities that affect all aspects of environmental management.	Improper training can compromise employee and visitor safety and can potentially effect any given park resource.
11. Hazardous, Solid & Universal Waste Management AF, EO, R, HS, E,	The park operation generates solid and universal wastes. Park visitors contribute a significant volume of solid waste to the park waste stream. Park staff store and dispose of solid and universal wastes.	Proper handling and disposal is labor intensive and costly. Leaks, spills, or fire can cause water, soil, and air pollution concerns. Potential impacts to employee and visitor health and safety.
12. Law Enforcement , Weapons Maintenance, Ammunition, Evidence Storage and Disposal AF, EO, R, HS, E,	Law Enforcement activities require storage of animal parts, firearms, drugs, vehicles, etc. as evidence for court cases. A substantial quantity of pistol, rifle and shotgun ammunition is stored at the Ranger Station with smaller working amounts of ammunition in office areas and patrol vehicles. Gun cleaning solvents and oils are stored and used by LE Staff.	These operations consume moderate amounts of electricity, water, and fuel. There are disposal costs and environmental risks (water, soil and air pollution), if evidence is not handled and disposed of properly. Fluid leaks from stored vehicles can cause water and soil pollution concerns. There is possible employee exposure to hazardous materials when collecting, processing and storing evidence.
13. Housing EO,HS, E,	Tenants of park housing use electricity, fuel, water and assorted chemical products; and generate wastewater and solid, universal, and hazardous wastes.	Consumptive use of electricity, fuel, water and raw materials. Wastes generated create disposal costs and environmental risks (water or air pollution) if not handled and disposed of properly.
AF=Audit Finding EO=Required by Executive Order R=Required by Regulation HS=Health and Safety Issue E=Environmental Issue		

<p>14. Pest Management</p> <p>AF, EO, R, HS, E,</p>	<p>Staff purchases and use a wide variety of pesticides and apply throughout the park in all environments. Vehicles and other equipment may use electricity, water, fuel and raw materials. This generates solid and hazardous wastes.</p>	<p>Consumptive use of fuel, electricity, water, and raw materials. Pesticide application may also create environmental risks. Use of pesticides contribute to employee health and safety risks. Wastes generated create disposal costs / environmental risks (water or air pollution) if not handled and disposed of properly. Spills & leaks can cause water, ground water, soil, and air pollution concerns</p>
<p>15. Administrative Facility Operations (offices, storage areas, etc.)</p> <p>EO, HS,</p>	<p>Staff uses electricity, fuel, water (e.g., restrooms) and a variety of consumable products. This generates wastewater and solid, universal, and occasionally hazardous wastes.</p>	<p>Consumptive use of power, water and raw materials. Wastes generated create disposal costs and environmental risks (water or air pollution) if not handled and disposed of properly. Generates storm water runoff concerns.</p>
<p>AF=Audit Finding EO=Required by Executive Order R=Required by Regulation HS=Health and Safety Issue E=Environmental Issue</p>		

2.5.2 Impact Assessment and Scoring

<i>VAFO EMS Document Control System</i>	Date of Original Doc: 11-16-05	Revision Date: n/a	Revision No. n/a
Doc Name: Impact Assessment and Scoring	Document Number: VAFO-EMP-3	Prepared By: EMT	Approved By: EMT

Significant Impact Ranking

EMT Member	Earl C.	Barb. P.	Jeff K.	Doug R.	Meg. C.	Cindy N.	Walt D.	Randy B.	VS Rep	Average Score
1. Hazardous Materials Storage and Handling	8	-----	8	8	8	8	8	8	-----	8*
2. Green Parks- Conservation, Recycling and Purchasing	3	-----	4	4	5	4	4	4	-----	4.6
3. Vehicle & Equipment Use & Maintenance	8	-----	8	8	8	7	8	8	-----	7.8*
4. Emergency Planning and Operations	5	-----	6	7	6	7	6	7	-----	7.3
5. Property Management and Disposal	3	-----	2	3	3	2	3	3	-----	2.6
6. Building Maintenance (Renovation, deomolition, major construction/ rehab projects, HVAC, plumbing,general cleaning, carpentry, etc.)	8	-----	8	8	8	8	8	8	-----	8*
7. Custodial	7	-----	8	8	6	8	8	8	-----	7.5*
8. Black Powder Operations	3	-----	3	3	3	4	3	3	-----	3.1
9. Environmenta l Training and Education	7	-----	7	7	7	7	7	7	-----	7
10. Grounds, Roads and Trail	6	-----	6	6	6	6	6	6	-----	6

Maintenance										
11. Hazardous, Solid & Universal Waste Management	7	----	7	8	7	6	7	7	----	6.8
12. Law Enforcement , Weapons Maintenance, Ammunition, Evidence Storage and Disposal	6	----	6	6	7	6	7	6	----	6.3
13. Housing	4	----	5	5	6	4	4	5	----	5.5
14. Pest Management	7	----	8	8	7	8	8	8	----	7.6*
15. Administrative Facility Operations (offices, storage areas, etc.)	4	----	3	4	5	3	4	3	----	4.3

***Denotes facility impacts with average scores between 8.0 and 7.5**

2.6 Ranking System Methodology

The following components make up the interactions and impacts analysis ranking system. Each facility activity is assessed and, based upon a summation of the following criteria, is deemed significant or not. Activities that received a score of 9 or higher were given initial priority for the development of Environmental Management Plan objectives.

2.6.1 A ranking score is assigned to each impact based on the following four criteria:

Regulatory

Environmental Audit Finding = 1 Point

Executive Order Required = 1 Point

Required by Regulation = 1 Point

Health & Safety Risk = 1 Point

Environmental Risk = 1 Point

Operational Impact in including financial, liability, and severity potentials to park operations were rated as follows:

Low = 1 Point

Moderate = 2 Points

High = 3 Points

A total of 8 points is possible for each facility activity. The EMT individually rated each facility activity. The ranking scores were established by averaging the rating scores for each facility activity. Facility Activities that have an average score of between 7.5 and 8 will receive the first priority of the VAFO EMP.

<i>VAFO EMS Document Control System</i>	Date of Original Doc: 11-17-05	Revision Date: n/a	Revision No. n/a
Doc Name: Legal and Other Requirements	Document Number: VAFO-EMP-04	Prepared By: EMT Leader	Approved By: EMT

2.7 Legal and Other Requirements

<i>Federal Laws</i>
<i>National Environmental Policy Act (NEPA)-Environmental Documentation and Planning</i>
<i>Clean Air Act (CAA)-Air Emissions</i>
<i>Emergency Planning and Community Right-to-Know Act (EPCRA)-Chemical Spills and Releases, Hazardous Chemical Reporting</i>
<i>Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA)-Management of Pesticides</i>
<i>Occupational Safety and Health Act (OSHA)-Workplace Safety</i>
<i>Pollution Prevention Act (PPA)-Recycling, Source Reduction, Energy and Water Conservation</i>
<i>Resource Conservation and Recovery Act (RCRA)-Solid and Hazardous Waste Disposal</i>
<i>National Historic Preservation Act (NHPA) - Cultural Resource Preservation and Planning</i>
<i>Pennsylvania State Laws</i>
<i>Title 25. Environmental Protection Chapters 260a to 270a, Hazardous Waste</i>
<i>Title 25. Environmental Protection Chapters 287 to 299, Residual Waste</i>
<i>Act 2, Land Recycling Program</i>
<i>Federal Regulations and Executive Orders</i>
<i>40 CFR 261-267 RCRA Hazardous Waste</i>
<i>40 CFR 100-149-Water</i>
<i>40 CFR 150-189-Pesticides</i>
<i>40 CFR 300-399-EPCRA requirements, MSDSs</i>
<i>40 CFR 1500-1518-NEP A</i>
<i>36 CFR 800 - Protection of Historic Properties</i>
<i>Executive Order 12196-Federal Agency Compliance with OSH Act & OSHA Regulations</i>
<i>Executive Order 11814-Protection and Enhancement of Environmental Quality as amended by Executive Order 11911</i>
<i>Executive Order 12088-Federal Compliance with Pollution Control Standards</i>
<i>Executive Order 12780-Federal Agency Recycling and the Council on Federal Recycling and Procurement Policy</i>
<i>Executive Order 12843-Procurement Requirements and Policies for Federal Agencies for Ozone-Depleting Substances</i>
<i>Executive Order 12845-Requiring Agencies to Purchase Energy-Efficient Computer</i>

Equipment
<i>Executive Order 12856-Federal Compliance with Right-to-Know Laws and Pollution Prevention Requirements</i>
<i>Executive Order 12902-Energy Efficiency and Water Conservation at Federal Facilities</i>
<i>Executive Order 13101--Greening the Government Through Waste Prevention, Recycling, and Federal Acquisition</i>
<i>Executive Order 13112-Invasive Species</i>
<i>Executive Order 13123--Greening the Government Through Efficient Energy Management</i>
<i>Executive Order 13148-Greening the Government Through Leadership in Environmental Management</i>

3.0 GOALS, OBJECTIVES, AND TARGETS

3.1 Purpose

To describe the process used by the VAFO EMS to choose appropriate goals, objectives, and targets for the EMS.

3.2 Scope

This section contains a description of how goals, objectives, and targets were chosen for the significant impacts previously identified in Section 2.

Goals, objectives, and targets are identified and reviewed during this process to maintain and improve park operations; to preserve, conserve, and protect park resources; and to demonstrate environmental leadership.

These goals, objectives, and targets are practical, realistic, and provide clear direction for the environmental management activities of the parks. Chosen goals, objectives, and targets will normally be achieved within the calendar year.

3.3 Procedure

3.3.1 The EMT uses the significant ranking table in Section 2, Facility Activities and Environmental Impacts, to identify those significant impacts to be addressed through the imposition of goals, objectives, and targets.

3.3.2 In addition to 1) above, the EMT uses the list of open environmental audit findings as part of the process to determine appropriate goals, objectives, and targets.

3.3.3 The goals, objectives, and targets are listed in separate tables and included in the appendix to this section. Any information used to substantiate the choice of goals, targets, and objectives will be incorporated or referenced in Section 3.4 of this section.

3.3.4 The EMT develops an action plan (i.e., targets) for each identified goal and objective. The action plan describes how the specific goals and objectives will be achieved. It details who is responsible for each of the goals and objectives identified, and what resources are available for their achievement. It outlines dates by which these goals and objectives are to be accomplished.

3.3.5 The EMT will meet at least quarterly to review progress toward the accomplishment of goals, objectives and targets.

3.4 Responsibilities

3.4.1 The EMT selects the EMS goals, objectives, and targets for the year and establishes an action plan to accomplish them.

3.4.2 The EMT meets at least quarterly to review progress toward the accomplishment of goals, objectives and targets.

3.5 Appendix

The appendix contains the following:

3.5.1 Goals, Objectives, and Targets (Action Plan)

<i>VAFO EMS Document Control System</i>	Date of Original Doc: 12-14-05	Revision Date: n/a	Revision No. n/a
Doc Name: Environmental Goals, Objectives, and Targets Action Plan	Document Number: VAFO-EMP-05	Prepared By: EMT	Approved By: EMT

Environmental Goals, Objectives, and Targets

Action Plan

IMPROVE STORAGE, USE AND DISPOSAL OF WORKPLACE CHEMICALS

Facility Activity: Goals and Tasks	Responsible Party	Budget	Completion Date	Results
Goal 1: Implement the Hazard Communication Program parkwide for park employees, partners and contractors that incorporates inventory, labeling, MSDS Management, and training for park staff as required by DO-50.	Earl Cram Division Chiefs Supervisors	Staff Time	5/30/06	
Goal 2: Implement chemical purchasing and workplace process review for the elimination and purchase of safer, more environmentally friendly chemical products parkwide. Plan each task so as to purchase only a sufficient amount of chemical product for the job.	Earl Cram Walt Donikowski Division Chiefs Supervisors	Staff Time	5/30/06	
Goal 3: Perform Training for all park employees in the HazCom and workplace chemical safety as required by DO-50.	Earl Cram HazCom Trainers: Earl Cram Ron Boice Fred Dell Angelo Fred Euganeo	Staff Time	05/30/06	

Environmental Goals, Objectives, and Targets Action Plan LEAD BASED PAINT MANAGEMENT

Facility Activity: Goals and Tasks	Responsible Party	Budget	Completion Date	Results
Goal 1: Ensure that employees and contractors involved building maintenance, renovation, and demolitions activities that disturb lead paint receive training; maintain lead certifications; receive & use PPE properly, and receive medical monitoring as required by the OSHA standards.	Facility Manager, B&U Foreman, Park Safety Officer	2500.00 per Annum	06/30/06 pending selection of B&U Foreman	
Goal 2: Complete Inspections and/or Risk Assessments for a)Target Housing & b) all park buildings.	Safety Officer, Facility Manager	118,850.00	09-30-06 pending funding for PMIS 120679	
Goal 3: Ensure that a scope of work is completed for every activity that disturbs 2 or more square feet of LBP that protects human health and the environment by controlling lead releases.	Facility Manager, B&U Foreman, Park Safety Officer	Staff Time	01-01-06	
Goal 4: Lead Paint debris and contaminated soil is the largest hazardous waste stream generated in the park. Ensure that all Lead Paint is properly characterized, stored, labeled, manifested and disposed of.	Facility Manager, B&U Foreman, Park Safety Officer	3000.00 per annum	01-01-06	

Environmental Goals, Objectives, and Targets Action Plan ENVIRONMENTAL AUDIT

Facility Activity: Goals and Tasks	Responsible Party	Budget	Completion Date	Results
Goal 1: Review audit for deficiencies, set goals, and assign responsibilities	EMT	Staff Time	01-15-06	
Goal 2: Set annual goals for responsible parties in their annual performance appraisals.	Division Chiefs	Staff Time	11-01-06	
Goal 3: Hold staff with purchasing authority accountable for purchasing green products and services.	Barb Pollarine, Walt Donikowski	None	02-28-06	
Goal 4: Establish an environmental award recognition program.	B. Pollarine	None	04-30-06	

Environmental Goals, Objectives, and Targets Action Plan PESTICIDE MANAGEMENT & USE

Facility Activity: Goals and Tasks	Responsible Party	Budget	Completion Date	Results
Goal 1: Complete a comprehensive pesticide management and use policy that incorporates IPM and is accountable for all park employees, quarters occupants, partners, and contractors.	Facility Manager, IPM Coordinator,	Staff Time	02-28-06	
Goal 2: Establish IPM approval, purchasing, inventory, and use reporting requirements for park employees, partners and contractors.	B. Pollarine, IPM Coordinator, Facility Management	Staff Time	06-30-06	
Goal 3: Provide training to park staff on pesticide policy, use and management. Pesticide training should be incorporated as part of the HazCom Training program	IPM Coordinator HazCom Trainers: Earl Cram Ron Boice Fred Dell Angelo Fred Euganeo		05-30-06	

4.0 ROLES, RESPONSIBILITIES, AND ACCOUNTABILITY

4.1 Purpose

To assign roles, responsibilities, and accountability to personnel charged with both specific EMS and general environmental management activities within VAFO.

4.2 Scope

Sound environmental practices, like sound safety practices, are considered the job of everyone at VAFO. This responsibility is incorporated into all position descriptions as a general performance element on environmental management.

4.3 Procedure

4.3.1 The EMT compiles a detailed listing of all personnel on the EMT.

4.3.2 The EMT lists all personnel involved with the VAFO EMS.

4.3.3 The EMT completes all associated Manual tables identified in the appendix to this section.

4.3.4 The roles and responsibilities identified in this section conform to the established personnel system based on relevant documentation.

4.3.5 The EMT reviews position descriptions and job responsibilities for all personnel. Critical environmental responsibilities are identified and incorporated into position descriptions and annual performance plans for key employees.

4.3.6 The EMT identifies key roles and responsibilities for appropriate third parties (future concessionaires, contractors, etc.) operating in the park. These roles and responsibilities are incorporated into appropriate contract documents.

4.3.7 Employees are informed of their designated environmental responsibilities when they start their jobs. They are made aware of these responsibilities and associated environmental practices at the time of assignment through an initial park orientation training and specific job orientation provided by their supervisors.

4.3.8 Duties are assessed by supervisors in the course of day-to-day activities. Supervisors are responsible for correcting staff on an ad hoc basis when improper procedures are observed.

4.3.9 Supervisors are responsible for conducting formal annual performance evaluations for staff under their administration. This performance evaluation considers performance related to the general performance element and job-specific performance requirements in personnel position descriptions, as well as personnel success in meeting EMS goals. Performance is to be measured using Service criteria and procedures.

4.3.10 Failure to complete designated environmental responsibilities in a satisfactory manner may be grounds for disciplinary action and termination, dependent upon the severity and persistence of the behavior, in accordance with Service policies and procedures.

4.4 Responsibilities

The EMT updates the tables detailing EMT and other EMS personnel.

4.5 Appendix

The appendix contains the following:

4.5.1 A table listing the members of the VAFO EMT.

<i>VAFO EMS Document Control System</i>	Date of Original Doc: 12-14-05	Revision Date: n/a	Revision No. n/a
Doc Name: Environmental Management Team	Document Number: VAFO-EMP-06	Prepared By: EMT	Approved By: EMT

Environmental Management Team

Position	Name	Contact Information
Team Leader	Earl Cram Park Safety Officer	Phone: 610-783-5438 Cell: 610-587-5968
Team Member	Barbara Pollarine Deputy Superintendent	Phone: 610-783-1032 Cell: 610-780-5232
Team Member	Jeff Kangas Facility Manager	Phone: 610-783-1028 Cell: 610-656-8943
Team Member	Walt Donikowski Contracting & Purchasing	Phone: 610-783-1033
Team Member	Doug Rogers Mechanic	Phone: 610-783-1048 Cell: 610-656-8939
Team Member	Cindy Neel Custodian	Phone: 610-783-1029
Team Member	Randy Beutler Mechanic	Phone: 610-783-1048 Cell: 610-656-8938
Team Member	Meghan Carfioli Ecologist	Phone: 610-783-1041
Team Member	Vacant Visitor Services Rep.	

4.5.2 A table detailing the roles and responsibilities associated with the targets identified in Section 4.3.

<i>VAFO EMS Document Control System</i>	Date of Original Doc:	Revision Date: n/a	Revision No. n/a
Doc Name: EMS Roles and Responsibilities	Document Number: VAFO-EMP-07	Prepared By: EMT	Approved By: emt

EMS Roles and Responsibilities

Position	Responsibility
<i>Superintendent</i>	General manager of VAFO, with overall responsibility for the management of park programs, operations, and internal/external relationships.
<i>Deputy Superintendent</i>	Manages activities of all park operations and supervises the division chiefs for each operation. Serve as EMT Member
<i>Natural Resources</i>	Manages the park's natural resources management and science operations and programs. Serve as EMT Member
<i>Facility Manager</i>	Manages park facility maintenance operations and programs. Supervises Park IPM Coordinator. Serve as EMT member.
<i>IPM Coordinator</i>	Manages Park Integrated Pest Management Program and ensures compliance with Federal, NPS, State, and local policy and regulations governing use of pesticides.
<i>IPM Applicator</i>	Supervises the management, storage and use of pesticides.
<i>Chief of Visitor Services</i>	Manages visitor protection operations and interpretive programs. Manages emergency medical and emergency response operations.
<i>Safety Officer</i>	Serves as the park's full-time safety officer and environmental compliance officer. Provides technical assistance and advice to Park Management and Operations. Serves as the Lead Paint and Asbestos program manager. Serves as EMT member, and is currently the team leader.
<i>Safety Committee</i>	Supervises facility maintenance operations, reviews all accidents, makes recommendations for reduction of environmental hazards, ensures compliance with ADA guidelines, and institutes ergonomic plan for admin.
<i>HazCom Trainer</i>	Has completed train-the-trainer course and instructs employees in the OSHA Hazard Communication Standard
<i>Contracting and Purchasing</i>	Prepares, negotiates and implements a diverse variety of construction and service contracts, which may include environmental components. Performs or coordinates major procurement and purchasing actions, which usually include green procurement considerations. Serves as EMT member.
<i>All Employees</i>	Have individual work site responsibility for implementing work activity related facets of the park environmental program and for complying with environmental requirements. Serve as EMT Members.

4.6 Related Documentation
N/A

4.7 Records
N/A

5.0 DOCUMENT CONTROL, RECORDKEEPING, AND REPORTING

5.1 Purpose

To describe the procedures to be followed to ensure a comprehensive document and record management system is implemented and maintained at VAFO. This system will ensure all appropriate personnel have access to documents and records necessary to manage environmental activities at VAFO.

5.2 Scope

This section describes how to manage environmental documents and records at VAFO.

5.3 Procedure

5.3.1 EMS documents for VAFO are maintained through a formal file management system. The central EMS documents file is maintained at the park headquarters. This file contains all key environmental documents and records generated by the VAFO EMS. The EMT Record Keeper is responsible for maintaining the file. In addition, key EMS documents are included in various appendices in this Manual.

5.3.2 Environmental records for VAFO are maintained through a formal environmental records management system, which conforms to Service and regional standards. The system is designed to ensure compliance with all reporting requirements mandated by law, regulation, and policy; maintain accountability for key operations; assure timely and efficient access to environmental data; and maintain security where necessary. The system consists of both hard copy and electronic files (where allowed by law).

5.3.3 Each EMS document and record receives a label containing specific information that will help in its control and file management. See Records Management SOP of VAFO for labeling documents and records other than EMS Manual forms. See Section 6 of this Manual for a detailed graphic depicting the contents of the EMS label.

5.3.4 Certain files such as logs and inspection and monitoring reports are generated, and/or required to be maintained, in operational areas. These reports are maintained at the point of use and are under the administrative control of the operational area supervisor. Some of these operational files may be designated as "*is important.*" These files are duplicated and copies or originals are maintained in the central file.

5.3.5 The EMS documents and environmental records tables, provided in the appendix, list all of the key documents, records, and reports used, generated, and/or submitted by the parks. The documents and records requirements listed in this table are reviewed and the table updated at least annually. A copy of the summary table is in the appendix to this section.

5.4 Responsibilities

5.4.1 The EMT is responsible for overseeing and making any required changes to the document control, record keeping, and reporting procedure.

5.4.2 The EMT Record Keeper is responsible for keeping the environmental document, records, and reporting control table current.

5.5 Appendix

The appendix contains the following:

5.5.1 A table listing the VAFO_ EMS documentation and records.

<i>VAFO EMS Document Control System</i>	Date of Original Doc:	Revision Date: n/a	Revision No. n/a
Doc Name: EMS Documentation and Records	Document Number: VAFO-EMP-08	Prepared By:	Approved By:

EMS Documentation and Records

Document	Location	Document Number	Party Responsible for Update
EMT information	Safety Office		EMT Leader
EMS planning activities, implementation and operation procedures	Safety Office		EMT Leader
EMS roles and responsibilities	Safety Office		EMT Leader
Internal Audits	Safety Office		EMT Leader
External Audits (EPA/OSHA)	Safety Office		EMT Leader
Annual Management Reviews	Safety Office		EMT Leader
Oil Spill Information	Safety Office		EMT Leader
Energy Audit Information	Maintenance		Facility Manager
Manifests (Hazardous Waste, Universal Waste, Biohazard Waste)	Safety Office		EMT Leader
Document	Location	Document Number	Party Responsible for Update
Lead Test Documents	Maintenance		Facility Manager
Asbestos Containing	Maintenance		Facility Manager

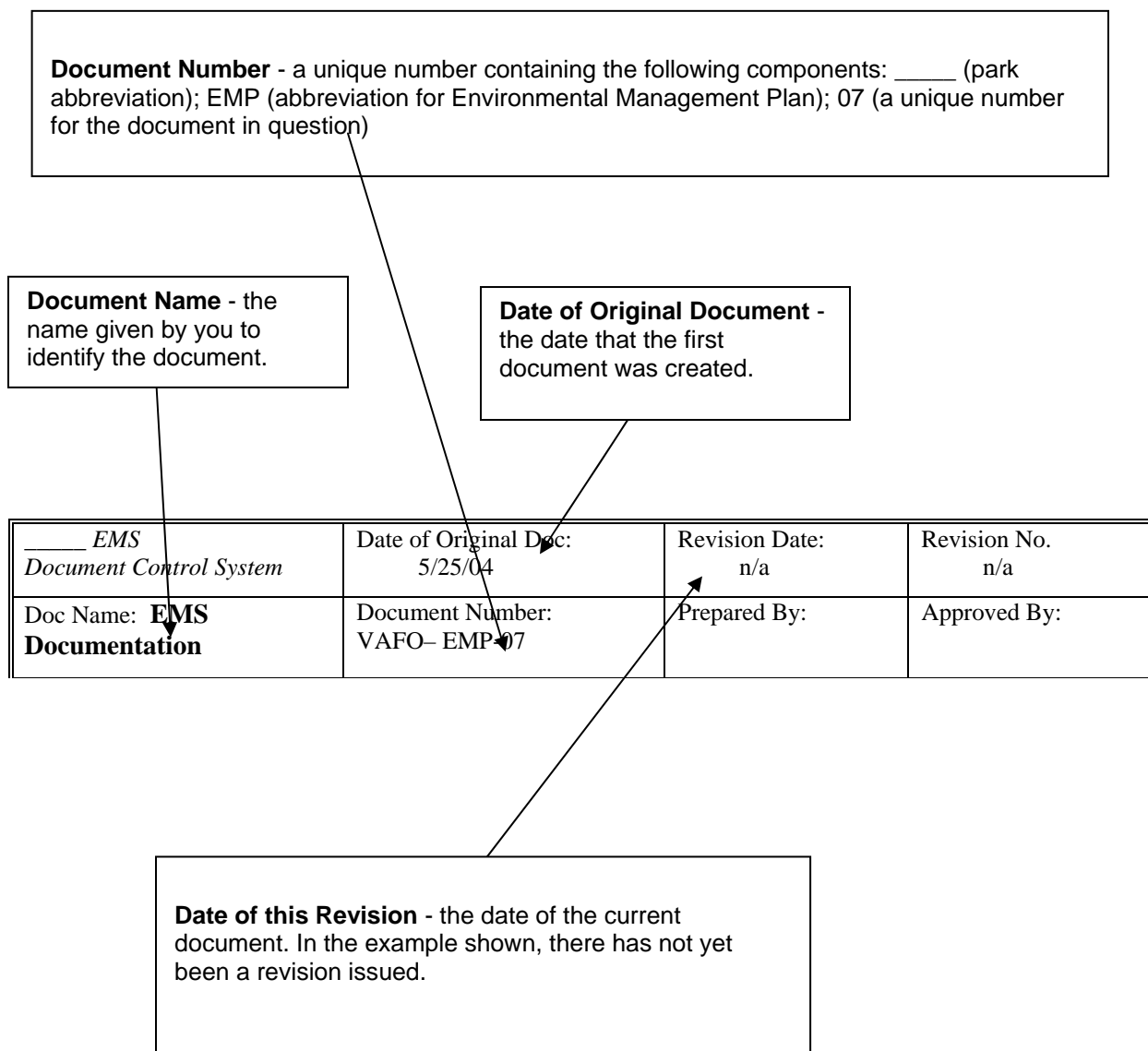
Materials Documents			
Hazardous Waste, Universal Waste, and Current Tracking Inventory	Safety Office		EMT Leader
404 Permits	Administration Building		Chief, Planning & Resource Management
<i>Training Records</i>	Human Resources		Personnel Assistant
VAFO Hazardous Waste Management Plan			EMT Leader
Integrated Pest Management Plan			Facility Manager
Integrated Solid Waste Plan			Facility Manager

5.6 Related Documentation

VAFO Records Management applies to all government records in all offices at VAFO.

5.7 Records

The following graphic depicts the elements of the VAFO document and record EMS management label, attached either electronically or manually to each controlled document and record.



6.0 Communication

6.1 Purpose

To ensure that all appropriate parties that require information to manage environmental activities at VAFO receive that information in a timely manner, to publicize the successes of the VAFO Environmental Management System, and to involve all interested parties in environmental management at the parks.

6.2 Scope

This section details the VAFO approach to conduct communications internally (within park boundaries) and externally (outside park boundaries). Information relating to the communication required to achieve the identified goals, objectives, and targets is also included.

6.3 Procedure

6.3.1 The EMT uses general internal and external communication.

6.3.2 Internal communication ensures that all staff and appropriate partners operating in the parks are kept up-to-date on environmental matters, and are provided with the necessary information to perform their duties. Internal communication methods provide a venue for personnel to provide input on environmental performance.

6.3.3 Methods of internal communication include training classes, staff meetings, written policies and procedures, formal and informal talks, internal e-mails and memos, and others.

6.3.4 External communication ensures the appropriate sharing of information with all parties interested in the operation of VAFO.

6.3.5 External communication is maintained through formal National Park Service public announcements, the general Service website (www.nps.gov) and the park websites, press releases, briefings/presentations, public interfaces, written correspondence, and other casual information sharing. All public announcements conform to Service protocol and regional standards. External parties vary considerably; they can be park support groups or interested visitors requesting information on park greening practices and energy and water conservation.

6.3.6 The EMT designs and implements specific communication needs relating to the achievement of the identified goals, objectives, and targets.

6.4 Responsibilities

6.4.1 The EMT is responsible for maintaining the communication strategy.

6.4.2 EMT members write informational pieces on EMS progress and provide them to proper channels for distribution.

6.4.3 The Superintendent or designated individual reviews all external documentation prior to release.

6.5 Appendix

The appendix contains the following:

6.5.1 A table detailing both the general internal and external EMS communication strategy.

<i>VAFO EMS Document Control System</i>	Date of Original Doc: 12-14-05	Revision Date: n/a	Revision No. n/a
Doc Name: EMS Communications Strategy	Document Number: VAFO-EMP-09	Prepared By: EMT	Approved By: EMT

EMS Communication Strategy

Audience	Communication Type / Mechanism	Content	Responsibility
Park Personnel	Email, hard copy memo, plans, directives, web & intranet sites		
Partners and community groups	Email, hard copy memo, plans, directives, park website		
Regulatory Agencies	Email, hard copy memo, plans, directives, park website		
General Public	Press Releases, bulletin boards, park website, signs & posters		

6.6 Related Documentation

N/A

6.7 Records

N/A

7.0 TRAINING

7.1 Purpose

To provide a system to manage the environmental training needs of personnel at VAFO; to ensure the right environmental information is given to the right individuals, and to enable them to carry out their duties to the best of their abilities.

7.2 Scope

This training section describes how the environmental training programs at VAFO are managed.

7.3 Procedure

7.3.1 The EMT ensures that the personnel at VAFO are provided with the knowledge and skills to safely, competently, and legally fulfill their EMS and other environmental responsibilities.

7.3.2 Individual division chiefs and supervisors annually assess all positions under their control at VAFO to determine the associated training requirements for these positions. Park management coordinates such a review with the supervisors and the EMT.

7.3.3 Supervisors are invited to report to the EMT on a periodic basis (no less than annually) about the training requirements for personnel under their supervision and the status of training for those individuals.

7.3.4 Based on the assessment under 2) above, training for specific individuals or work units is scheduled by supervisors and coordinated through the Environmental Protection Specialist.

7.3.5 Different methods of training may be utilized at VAFO including traditional classroom, field practicum, and distance learning. Training is offered through internal park programs, regional and Service programs, and commercial trainers.

7.3.6 All training conducted at VAFO complies with training standards developed by the region and the Service.

7.3.7 Every effort is made to invite, or partner with, third parties within the parks, such as contractors and concessionaires where appropriate, to leverage training resources and to encourage collaboration and foster understanding by all parties with the parks.

7.4 Responsibilities

7.4.1 Individual responsibilities for determining training requirements and maintaining training records are described in section 1.0 of this section.

7.4.2 Overall coordination of environmental training at VAFO lies with input from EMT, through the Park Supervisors..

7.5 Appendix

The appendix contains the following:

7.5.1 The VAFO_ environmental and safety training matrix.

VAFO EMS <i>Document Control System</i>	Date of Original Doc: 12-14-05	Revision Date: n/a	Revision No. n/a
Doc Name: EMS Environmental and Safety Training Matrix	Document Number: VAFO-EMP-10	Prepared By: EMT	Approved By: EMT

Environmental and Safety Training Matrix

Division: _____ **Position Title/Series/Grade:** _____

Prepared by (Supervisor): _____ **Date Prepared:** _____ **Employee Name**
(optional): _____ **Reviewed by EPS:** _____

✓	Training Needed	Frequency	Trainer/ Responsible Party	✓	Training Needed	Frequency	Trainer/ Responsible Party
	Environmental				CPR		
	Energy Conservation orientation				Emergency Procedures, Bldg. evac.		
	Green Procurement				Emergency procedures, What to do in case of accident of injury		
	Hazardous Waste Mgt Procedures				Equipment op., engineering equip.		
	Hazardous Waste Manifesting				Ergonomics, computer workstations		
	HAZCOM				Ergonomics, lifting & carrying		
	HAZWOPER				Fire extinguisher use		
	Integrated Pest Management				First Aid		
	P2 & Source Reduction orientation				Heat Stress SOP		
	Recycling Program orientation				Job Hazards		
	Solid Waste Mgt orientation				Lead Paint Safety		
	SPCC Plan				Lockout / Tagout		
	Spill Response SOP				PPE, Eye Protection SOP		
	Other				PPE, Footwear Program		
	SAFETY TRAINING				PPE, Hearing Protection SOP		
	Asbestos Awareness				Respiratory Protection		
	Accident Reporting Procedures (use of SDF, etc.)				Safety Committee awareness		
	Blood borne Pathogen/HBV				Safety Manual		
	Chemicals (used for cleaning)				Slips, Trips & Falls		
	Chainsaw operation and safety				Tick Talk		
	Confined Space Entry				Other		

7.6 Related Documentation

N/A

7.7 Records

7.7.1 The summary environmental training matrix (contained in the appendix to this section) will be updated to reflect current park needs in accordance with sections 7.1.2 and 7.1.3 of this section. At a minimum, the matrix will detail the type and frequency of training required by VAFO staff in their various positions. It will also include who is responsible for administering the training.

7.7.2 In order to ensure that all the appropriate training has been received by the individual in a particular position, detailed records of who has received environmental training will be maintained by the division and/or the EMT Record Keeper.

8.0 MONITORING, MEASUREMENT, CORRECTIVE ACTION, AND MANAGEMENT REVIEW

8.1 Purpose

To ensure the best opportunity to achieve the set goals, objectives, and targets and other environmental management responsibilities within VAFO; to correct efforts where needed; and to provide guidance and assistance to those involved in achieving positive outcomes in environmental management in the parks.

8.2 Scope

This section describes the various assessments undertaken to ensure that the performance of the environmental management activities, and those of other parties operating within the park, meet the standards set in the EMS Plan.

8.3 Procedure

8.3.1 The EMT conducts an annual Environmental Performance Review (EPR). The EPR will be led by the EMT leader and will determine whether the parks have achieved the environmental goals, objectives, and targets described in Section 3 of this Manual. The results of the EPR will be documented and a copy included in the appendix to this section and maintained on file in the Record Keeper's office.

8.3.2 If no progress has been made towards the stated goals, objectives, and targets, the EMT determines why, and implements new operating procedures that encourage appropriate personnel at VAFO to achieve the stated environmental goals, objectives, and targets.

8.3.3 The EMT meets at least quarterly to review how well the parks are doing in achieving the goals, objectives, and targets, and other EMS requirements. These reviews are designed to allow

for “mid-course” corrections to be effected if it is determined that suitable progress towards achieving the goals, objectives, and targets has not been made and their final achievement is unlikely. The goals, objectives, and targets action plan will be updated after the quarterly review.

8.3.4 On a quarterly basis the EMT provides the Superintendent a copy of the updated action plan which details the progress made towards achieving the park EMS goals, objectives, and targets.

8.3.5 The Environmental Protection Specialist conducts or coordinates weekly inspections of hazardous waste storage areas, and periodic inspections of the maintenance shops.

8.3.6 A designated Buildings & Utilities (B&U) employee conducts monthly inspection throughout the parks.

8.3.7 EMT members may conduct site-specific inspections and audits at any time.

8.3.8 The Safety Committee of the parks, which generally meet monthly, conducts inspections of various park facilities and reports its findings to the Environmental Protection Specialist.

8.3.9 All employees are encouraged to report environmental and safety concerns to their supervisor through a documented reporting system. Reported concerns are forwarded to the Environmental Protection Specialist for review and investigation, if needed.

8.3.10 Every three to five years the park receives a follow-up audit from the region using the NPS Environmental Audit protocol. The EMT coordinates the audit with appropriate regional personnel.

8.3.11 As necessary and required by permits or established by an SOP, additional day-to-day or regulatory-driven monitoring and measurements are completed and documented by the responsible party. Records are maintained in accordance with established document and record control requirements.

8.4 Responsibilities

The specific responsibilities for monitoring and reporting depend on the involvement of individuals in specific goals, objectives, and targets. The overall responsibility for ensuring that the monitoring and reporting activities take place, as described in Section 8.1, lies with the EMT.

8.5 Appendix

The appendix contains the following:

8.5.1 The monitoring and measurement summary matrix (including overall EMS and specific goals, objectives and target responsibilities).

<i>VAFO EMS Document Control System</i>	Date of Original Doc: 12-14-05	Revision Date: n/a	Revision No. n/a
Doc Name: Monitoring and Measurement	Document Number: VAFO-EMP-11	Prepared By: EMT	Approved By: EMT

Monitoring and Measurement

Review Event	Frequency	Responsibility	Results Due
Individual site inspections or audits	Annually	EMTL	12-31-06
Annual Performance Review (EMS assessment)	Bi-annually	EMT	05-30-06, 12-31-06
Review of goals, objectives, and targets — action plan updated	Semi-monthly	EMT	05-30-06, 12-31-06
Inspections of hazardous waste storage areas	Monthly	EMTL	
Inspections of various park facilities	Annually	EMTL	12-31-05
Energy Report			
Environmental Audit	Semi-monthly	EMT	05-30-05

8.6 Related Documentation

N/A

8.7 Records

8.7.1 EPR summaries will be included in the appendix to this section.

8.7.2 Any documents developed during monitoring and measurement activities will be included in the appendix to this section.

8.7.3 Any required corrective action forms will be included in the appendix to this section.

